

**AMENDMENT**

**U.S. Appln. No. 09/915,543**

**REMARKS**

Support for new Claims 71-78 can be found, *inter alia*, in the cancelled claims (and original Claims 15-16, 23-24 and 28); and at page 9 of the specification, wherein it is taught that:

The invention also relates to nucleotide sequences and the respective peptides derived therefrom comprising at least one of the homology domains between Drosophila and human Lgs described in Figure 7B (SEQ ID Nos:2-13) and the use of said peptides to block Lgs function in cancer cells.

and, at pages 20 and 44 of the specification, wherein it is taught that Figure 15B shows the effects on Lgs HD2 peptides on cancer cells.

Figure 7B shows that HD2 consists of amino acids 349-383 of SEQ ID NO:15 (which corresponds to SEQ ID NO:5), and HD1 consists of amino acids 177-204 of SEQ ID NO:15 (which corresponds to SEQ ID NO:3); and page 44 teaches use of small peptides including HD1 (*sic* HD2) (such as hLgs/Bc19 (199-392) or hLgs/Bc19 (279-392)).

The specification has been amended to correct an obvious typographical error, at page 44, where "HD1" should recite "HD2". It is apparent that this is a typographical error since Figure 7B shows that HD2 consists of amino acids 349-383, whereas HD1 consists of amino acids 177-204. Thus, hLgs/Bc19 (199-392) and hLgs/Bc19 (279-392) contain HD2, but not a complete HD1.

Hence, the amendments to the specification and claims do not constitute new matter, and thus entry is requested.

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On pages 2-4 of the Office Action, the Examiner acknowledges Applicants' election of the invention of Group II, i.e., Claims 13-16, 20-21, 23-24, 44 and 63, with traverse.

Applicants hereby cancel non-elected Claims 17, 29, 25-34, 61, 62, 69 and 70 without prejudice to the filing of a Divisional Application(s) with respect thereto.

On page 4 of the Office Action, the Examiner acknowledges Applicants' election of SEQ ID NO:15.

Also, on page 4 of the Office Action, the Examiner objects to the Abstract as being longer than 150 words, and therefore requires correction.

Applicants hereby replace the Abstract with a new Abstract, thereby rendering moot the Examiner's objection.

Additionally, on page 4 of the Office Action, the Examiner rejects Claims 13-14, 20-21 and 63 under 35 U.S.C. § 112, second paragraph.

Specifically, the Examiner states that in Claim 13, it is unclear what is encompassed by the limitation "positive function".

Additionally, the Examiner states that Claim 13 is indefinite because it recites a protein comprising "derivatives" and "analogs" of a legless gene product.

Further, the Examiner states that Claim 13 is indefinite because it recites a protein comprising "a legless (lgs) gene product, derivatives, fragments and analogs thereof", i.e., the alternative forms of the protein are not recited.

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In view of the cancellation of Claim 13, Applicants respectfully submit that the Examiner's rejection has been rendered moot.

At the bottom of page 5 of the Office Action, the Examiner rejects Claims 13-16, 20-21, 23-24, 44 and 63 under 35 U.S.C. § 112, first paragraph.

Specifically, the Examiner states that the specification only discloses SEQ ID NOS:15 and 17 (which correspond to the human Bcl9 and lgs-1 proteins), SEQ ID NO:10 (which corresponds to the *drosophila* lgs protein). However, the Examiner states that Claims 13-16, 20-21, 44 and 63 are directed to polypeptides from other species, mutated versions of the polypeptides, polypeptides encoded by allelic variants and splice variants, derivatives and variants of these polypeptides which, the Examiner contends do not have written description in the specification.

In view of the cancellation of Claims 13-16, 20-21, 44 and 63, Applicants respectfully submit that the Examiner's rejection has been rendered moot.

On page 8 of the Office Action, the Examiner rejects Claims 13-16, 20-21, 23-24, 44 and 63 under 35 U.S.C. 102(e) as being anticipated by Tang et al.

Specifically, the Examiner states that Tang et al disclose an isolated polypeptide (SEQ ID NO:2178) that is 99.4% identical to amino acid residues 1-1392 of the instantly disclosed human lgs/Bcl9 protein (and 97% identical to the full-length protein (SEQ ID NO:15 of the present application)).

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For the following reasons, Applicants respectfully traverse the Examiner's rejection.

Applicants respectfully submit that Tang et al does not teach or suggest the polypeptides now claimed. The present claims are directed to isolated polypeptides which comprise peptide fragments of SEQ ID NO:15, where the peptides block Lgs function in colon cancer cells. The polypeptide described in Tang et al does not block Lgs function in colon cancer cells, indeed Lgs function in colon cancer cells is seen using a polypeptide which is 97% identical to the full-length protein described in Tang et al (see the positive control in Figure 15B of the present application).

Accordingly, Applicants respectfully submit that the present invention is not taught or suggested in Tang et al, and thus request withdrawal of the Examiner's rejection.

The Examiner is invited to contact the undersigned at his Washington telephone number on any questions which might arise.

~~Respectfully submitted,~~

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